Reconsideration of this application as amended is respectfully requested.

Claim Objections

The Examiner objected to claims 6-9, 23-25, and 30-33 because these claims included acronyms. The Examiner requested that the acronyms be spelled in the entire form. In response, Applicant respectfully submits that claims, as amended, have the acronym is spelled in the first use of the claim. Furthermore, the acronyms the Examiner cited as confusing are acronyms are well-known in the art and are not confusing. Therefore, Applicant respectfully submits acronyms are not confusing and respectfully requests the objection be removed.

Rejections under 35 U.S.C. § 101

The Examiner rejected claims 6-9, 23-25, and 30-33 under 35 U.S.C. § 101 because the Examiner asserts the claimed invention is directed towards non-statutory subject matter. In particular, the Examiner asserts that tangible machine-readable medium claims 23-25 and 30-33 are not limited to storage medium embodiments. In response, Applicant modified claims to claim "A machine-readable medium that stores instructions." Applicant respectfully submits that claims 23-33, as amended, satisfy the requirements of 35 U.S.C. § 101.

In addition, the Examiner rejected claims 6-9, 23-25, and 30-33under 35 U.S.C. § 101 because the Examiner states the claimed invention utility. The Examiner does not give a detailed reason why the claimed invention lacks utility. However,

> To properly reject the a claimed invention under 35 U.S.C. § 101, the Office must (A) make a *prima facie* showing that the claimed invention lacks utility, and (B) provide evidentiary basis for factual assumptions relied upon in establishing the *prima facie* showing. MPEP, § 2107.02(IV).

The Examiner simply states the claims fail to disclose the utility of the claimed invention. Applicant respectfully submits this is an improper rejection because the Examiner failed to establish a prima facie case and offered no evidentiary basis of factual assumption of why

the claims lacked utility. Applicant respectfully requests that Examiner remove the rejection.

Nevertheless, even assuming the utility rejection was properly asserted, Applicant respectfully submits that claims 6-9, 23-25, and 30-33 have utility. For example, claims 6, 23, and 30 are directed to maintaining a virtual private network. One of skill in the art would readily recognize that maintaining a virtual private network is useful. The dependent claims are useful because they depend on independent having utility. Thus, Applicant respectfully submits that claims 6-9, 23-25, and 30-33 have utility and satisfy the requirement of 35 U.S.C. § 101.

Furthermore, the Examiner rejects claims 6-9, 23-25, and 30-33 under 35 U.S.C. § 101 alleging that the claims do not provide any useful, concrete, and tangible results of the subject matter set forth. Applicant respectfully disagrees. In particular, claims 6, 23, and 30 are directed towards maintaining a single exterior gateway protocol (EGP) forwarding table between two layer 3 VPNs. Thus, claims have useful, concrete and tangible results.

Furthermore, the Examiner asserts that the claimed invention of claim 6-9, 23-25, and 30-33 can be done using paper, pencil, and a machine. As is well-known in the art, establishing and maintaining a layer 3 VPN requires a computer network. A computer network involves more than paper, pencil and a machine. Because claims 6-9, 23-25, and 30-33 are directed towards maintaining layer 3 VPNs, Applicant respectfully submits that claims 6-9, 23-25, and 30-33 involve more than simply paper, pencil, and a machine. Accordingly, Applicant respectfully submits that claims 6-9, 23-25, and 30-33 have the requisite statutory subject matter and satisfy the requirement of 35 U.S.C. § 101.

Rejections under 35 U.S.C. 102(e)

Applicant's claims 6-9, 23-25, and 30-33 have been rejected under 102(e) as being anticipated by Rekhtar, et al., US Patent No. 6,339,595. Applicant respectfully submits that Rekhtar does not disclose each and every element of the invention as claimed in claims 6-9, 23-25, and 30-33.

The Examiner asserts that any set of information referred to Rekhtar should be interpreted as "context" (1/20/06 Office Action, p. 3). Applicant respectfully disagrees. A context is a set of information or collection of data structures for a customer of a network

provider's network element (Applicant's Specification, paragraph 0021). In addition, a customer corresponds to a single context within the network element (Applicant's Specification, paragraph 0022). Context further enable isolation of traffic processed by a network element (Applicant's Specification, paragraph 0024). Furthermore, a context can support different types of customer network services: VPN and non-VPN ((Applicant's Specification, Fig. 2A, paragraph 0026-0032). Thus, Applicant respectfully submits that a context has a specific meaning and is not "any set of information."

Rekhtar discloses creating multiple virtual private networks (VPNs) using edge and transit routers (Rekhtar, Abstract). A VPN is private wide-area network is a private network connecting remote customers network over a service provider's core network (Rekhtar, Fig. 1, col. 6, lines 17-25). Each edge router couples to one or more customer networks to act as the ingress or egress points with the customer's remote networks (Rekhtar, col. 2, lines 63-65). The transit routers forward the customer's VPN traffic within the service provider's core network (Rekhtar, col. 2, line 66- col. 3, line 7).

The edge router identifies traffic as belonging to a particular customer's VPN, tags the incoming traffic, and forwards the tagged traffic to the next hop transit router (Rekhtar, col. 2, lines 63-65). Each edge router has a separate forwarding information base (FIB) for each supported VPN, but has only a general FIB for all other forwarding decisions (Rekhtar, col. 9, lines 27-35). On the other hand, the transit routers forward tagged VPN traffic using tag switching based on the transit router's tag information base (TIB) (Rekhtar, col. 10, lines 40-47). For each packet received, the transit router examines the tag associated with the packet, performs a lookup in the TIB, and forwards the tagged packet to the next hop router (Rekhtar, col. 10, lines 40-47). In addition, the transit router may swap the tag on the packet or remove the tag (Rekhtar, col. 10, lines 47-52).

Each FIB (or TIB) supports multiple protocols, including interior gateway protocol (IGP), exterior gateway protocol (EGP) and tag distribution protocol (TDP) (Rekhtar, col. 11, lines 7-18). While an edge router shares the EGP information with other edge routers, however, an edge router does not share the EGP information between VPNs, because the edge router maintains a separate FIB for each VPN (Rekhtar, col. 9, lines 28-35). Thus, each FIB is either a VPN specific FIB used for ingress/egress VPN forwarding/tagging

decisions or a general FIB used for all other forwarding decisions. Rekhtar does not disclose sharing a FIB among different VPNs.

Applicant respectfully submits that Rehktar does not teach or suggest Applicant's claims. In particular, Rekhtar discloses maintaining separate FIBs for each VPN and a general FIB. However, Rehktar does not teach or suggest sharing EGP routing information among VPNs.

For example, claims 6, 23, and 30, as amended, require "maintaining a first set of information for a first layer 3 VPN (virtual private network), the first set of information for including a first value identifying the first layer 3 virtual private network separately maintaining a second set of information for a second layer 3 virtual private network the second set of information for including a second value identifying the second layer 3 virtual private network, wherein the first and second sets of information corresponds to a first and second customers accessing a backbone and maintained within a single network element of the backbone, and wherein the first and second sets of information include sufficient information to establish the first and second layer 3 virtual private networks VPNs with other network elements of the backbone for the first and second customer respectively; associating the first value with a first route distinguisher; associating the second value with a second route distinguisher; ... and <u>maintaining a single exterior gateway protocol table for the first and second layer 3 virtual private networks</u>."

The above quoted limitations are not described or suggested by Rekhtar. While there are various uses for the invention as claimed, several such uses are discussed at paragraphs 0038 - 0042. Thus, while the invention is not limited to the uses discussed in these paragraphs, it should be understood that Rekhtar does not enable these uses and the above quoted limitations do.

For at least these reasons, Applicant respectfully submits that the independent claims are allowable. The Applicant respectfully submits that the dependant claims are allowable for at least the reason that they are dependent on an allowable independent claim.

Conclusion

Applicant respectfully submits that the rejections have been overcome by the amendments and remarks, and that the Claims as amended are now in condition for allowance. Accordingly, Applicant respectfully requests the rejections be withdrawn and the Claims as amended be allowed.

Invitation for a telephone interview

The Examiner is invited to call the undersigned at 408-720-8300 if there remains any issue with allowance of this case.
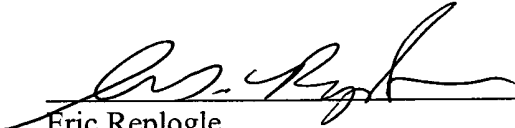
Charge our Deposit Account

Please charge any shortage to our Deposit Account No. 02-2666.

Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN LLP

Date: _Oct. 19_, 2006

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